

CORNELL UNIVERSITY OFFICIAL PUBLICATION

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Announcement of the University Division of Education 1927-28

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THE UNIVERSITY CALENDAR FOR 1927-28

Observed by all the departments of the University at Ithaca.

1927

FIRST TERM

Sept. 16, <i>Friday</i> ,	Entrance examinations begin.
Sept. 26, <i>Monday</i> ,	Registration and assignment of new students.
Sept. 27, <i>Tuesday</i> ,	
Sept. 27, <i>Tuesday</i> ,	Registration and assignment of old students.
Sept. 28, <i>Wednesday</i> ,	
Sept. 29, <i>Thursday</i> ,	Instruction begins at 8 A. M.
Oct. 21, <i>Friday</i> ,	Last day for payment of tuition for the first term.
Nov. 23, <i>Wednesday</i> ,	Instruction ends at 6 P. M.
Nov. 28, <i>Monday</i> ,	Instruction resumed at 8 A. M.
Dec. 17, <i>Saturday</i> ,	Instruction ends at 1 P. M.
1928	} Thanksgiving Recess } Christmas Recess
Jan. 2, <i>Monday</i> ,	
Jan. 11, <i>Wednesday</i> ,	Instruction resumed at 8 A. M.
Jan. 28, <i>Saturday</i> ,	Founder's Day.
Jan. 30, <i>Monday</i> ,	Instruction ends.
Feb. 8, <i>Wednesday</i> ,	Term examinations begin.
Feb. 9, <i>Thursday</i> ,	Term ends.
	A holiday.

SECOND TERM

Feb. 10, <i>Friday</i> ,	Registration of all students.
Feb. 13, <i>Monday</i> ,	Instruction begins at 8 A. M.
Mar. 5, <i>Monday</i> ,	Last day for payment of tuition for the second term.
Mar. 31, <i>Saturday</i> ,	Instruction ends at 1 P. M.
April 9, <i>Monday</i> ,	Instruction resumed, 8 A. M.
May 26, <i>Saturday</i> ,	Spring Day: a holiday.
June 4, <i>Monday</i> ,	Term examinations begin.
June 12, <i>Tuesday</i> ,	End of term examinations.
June 18, <i>Monday</i> ,	COMMENCEMENT.

UNIVERSITY DIVISION OF EDUCATION

FACULTY

LIVINGSTON FARRAND, A.B., M.D., L.H.D., LL.D., President of the University.

ADMINISTRATIVE COMMITTEE

GEORGE ALAN WORKS, Ed.D., Chairman of the Division.

THEODORE HILDRETH EATON, Ph.D.

RIVERDA HARDING JORDAN, Ph.D.

PAUL J. KRUSE, Ph.D.

ROBERT MORRIS OGDEN, Ph.D.

STAFF OF INSTRUCTION

THOMAS LEVINGSTON BAYNE, JR., Ph.D., Assistant Professor of Rural Education.

CORA ELLA BINZEL, B.S., Professor of Rural Education.

WILLIAM A. BROWNELL, Ph.D., Assistant Professor of Rural Education.

WILLIAM F. BRUCE, Ph.D., Instructor in Education.

ISABEL BULL, B.S., Instructor in Rural Education.

JULIAN EDWARD BUTTERWORTH, Ph.D., Professor of Rural Education.

*THEODORE HILDRETH EATON, Ph.D., Professor of Rural Education.

EMERY N. FERRISS, Ph.D., Professor of Rural Education.

FRANK S. FREEMAN, Ed.D., Instructor in Education.

MABEL HASTIE, B.S., Instructor in Rural Education.

EDWIN RAYMOND HOSKINS, M.S.A., Instructor in Rural Education.

RIVERDA HARDING JORDAN, Ph.D., Professor of Education.

PAUL J. KRUSE, Ph.D., Professor of Rural Education.

MAX LUDWIG WOLFRAM LAISTNER, M.A., Professor of Ancient History.

CLYDE B. MOORE, Ph.D., Professor of Rural Education.

CAROLINE J. MUSKAT, B.A., Instructor in Rural Education.

ROBERT MORRIS OGDEN, Ph.D., Professor of Education.

E. LAURENCE PALMER, Ph.D., Professor of Rural Education.

PERSERVED SMITH, Ph.D., Litt.D., Professor of Medieval History.

ROLLAND MACLAREN STEWART, Ph.D., Professor of Rural Education.

GEORGE ALAN WORKS, Ed.D., Professor of Rural Education.

ASSISTANTS

S. AMIR ALI, B.Agr., Assistant in Rural Education.

JAMES B. PALMER, B.S., Assistant in Rural Education.

JOHN M. SHALES, B.A., Assistant in Rural Education.

*Leave of absence, first term, 1927-28.

UNIVERSITY DIVISION OF EDUCATION

The formation of a University Division of Education at Cornell University was authorized by action of the Trustees on February 6, 1926. The Division has been formed by the affiliation of the Department of Education in the College of Arts and Sciences and the Department of Rural Education in the New York State College of Agriculture. This action did not discontinue the two departments but was designed to provide for a fuller coordination of their efforts than had previously existed. Each department maintains its autonomy and continues to perform such functions as are of primary concern to its college.

The offices of the Division are in Sage College. The chairman of the Division and the professor in charge of the appointment service will maintain regular hours in the Division offices. The appointment service is directed from this office. The activities of the University Committee on Mental Ability Testing are also conducted from it. The Department of Education in the College of Arts and Sciences and the Department of Rural Education in the College of Agriculture have their offices, laboratories, and class rooms in Goldwin Smith Hall and in Caldwell Hall, respectively.

PURPOSES OF THE DIVISION

The University Division of Education provides, through the cooperation of the existing departments, a means for meeting the needs of the University for work in Education.

The purposes of the Division are:

1. To offer undergraduates in Cornell University opportunity to obtain the professional preparation commonly required of those desiring to teach in the public schools. To this end a group of introductory courses designed for those who have had no teaching experience is offered.

2. To provide opportunity for advanced study for those who have had teaching experience. Persons engaged in teaching who desire to increase their professional equipment or to prepare themselves for more specialized positions than they are now holding will find courses designed to meet their needs.

3. To furnish opportunity for research and experimentation in educational theory and practice.

4. To satisfy the demand for extension courses on the part of teachers in service.

5. To maintain an adequate placement service for workers in Education.

All undergraduate resident students in the Division must be enrolled in some college of the University. This means that they must

meet the admission requirements of the college in which they are registered. Registration will admit them to such courses in the Division as they are qualified to pursue. In any extension courses that may be offered the students must meet such requirements as may be provided in connection with the courses.

The completion of a course in the University Division of Education does not necessarily mean that the course will be credited toward the degree of a particular college in the University. Those courses which appear in the announcements of the College of Arts and Sciences and the College of Agriculture are credited by the respective colleges. Students making elections from courses not included in the offerings of their college should make certain that they are acceptable to that college.

TUITION FEES IN THE UNDERGRADUATE COLLEGES

Facts regarding tuition fees in the several schools and colleges of the University can be found in the General Circular of Information.

GRADUATE WORK

Qualified students may be admitted to candidacy for the Master's degree or for the degree of Doctor of Philosophy with a major or a minor or both in some phase of Education.

A graduate of any college in which requirements for a first degree are substantially equivalent to those for the first degree at Cornell may be admitted to resident study in the Graduate School. He may at once enter upon candidacy for an advanced degree if he can show that he is qualified to pursue the subjects in which he proposes to work. The requirements for the degree are based upon actual achievement in scholarship and research in the fields indicated by the major and minor subjects, and do not depend primarily on the completion of any prescribed number of courses or of a fixed term of residence. Graduate work at Cornell is not expressed in terms of courses or of hours. The writing of a thesis and the passing of a special examination are also required. The minimum period of residence for the Master's degree is one academic year or its equivalent, and for the Doctor's degree, three years.

The residence requirements for advanced degrees may be fulfilled in whole or in part by attendance during the Summer Session of the University. For this purpose, two Summer Sessions will be regarded as the equivalent of one term, and four Summer Sessions as the equivalent of one year. Candidates for a Master's degree who are in residence during Summer Sessions only are required to continue their studies during the year under the direction of the chairman of the special committee in charge of their work.

Under certain conditions candidates for advanced degrees may work under the personal direction of some member of the faculty during the summer and have this work counted as residence credit.

In order to avoid delays at the beginning of the academic year, those who desire to enter the Graduate School are advised to make application for admission, either in person or by letter, in the preceding spring or summer. They should address the Dean of the Graduate School, Cornell University, Ithaca, N. Y., and also communicate with the professor under whose direction they desire to study.

For complete information regarding graduate work, the Announcement of the Graduate School should be consulted.

APPOINTMENT SERVICE FOR TEACHERS

An appointment service is maintained by the Division. Its purpose is to assist men and women who have studied or who are studying at Cornell University to secure positions in educational work. Such persons are invited to use this service, which is performed without charge. Those desiring assistance should communicate with the office of the Division.

OBSERVATION AND DIRECTED TEACHING

Special arrangements have been made with the local school authorities for the observation of teaching. To facilitate further the training of teachers in certain phases of the work, provision has been made for directed teaching in the nearby villages of Trumansburg and Groton.

PHYSICAL EDUCATION

The University Department of Physical Education offers a four-year undergraduate course designed to meet the requirements for the New York State Teacher's Certificate in Physical Education. The undergraduate desiring to prepare for the teaching of physical education should select the necessary courses in Education from those offered by the Division of Education.

METHODS COURSES IN ACADEMIC SUBJECTS

A group of courses for prospective teachers is offered in the College of Arts and Sciences to prepare for teaching various subjects of the secondary school curriculum. Elections from these may be made in meeting the requirements for the methods group. A description of each course will be found in the announcement of the College of Arts and Sciences.

TEACHERS' COURSE IN ENGLISH (English 69). Professor NORTHUP.
TEACHING OF FRENCH (French 30). Professor MASON.
TEACHERS' COURSE IN GERMAN COMPOSITION (German 39). Professor BOESCHE.
TEACHERS' COURSE IN METHODS (German 40). Professor FAUST.
TEACHING OF HISTORY (History 101). Professor BRETZ.
TEACHERS' TRAINING COURSE IN LATIN (Latin 26). Professors ELMER and DURHAM.

TEACHERS' COURSE IN MATHEMATICS (Mathematics 20). Assistant Professor CRAIG.

TEACHING OF PHYSICS IN SECONDARY SCHOOLS (Physics 91). Mr. FISHER.

TEACHERS' COURSE IN SPEECH TRAINING (Public Speaking 25). Assistant Professor MUCHMORE.

REQUIREMENTS FOR CERTIFICATION

To meet the requirements of the State of New York for any form of permanent certificate the candidate is required to complete 18 semester hours in education; or in lieu thereof to take examinations in the required subjects. The 18 hours are distributed as follows: Psychology, 6 hours; History and Principles of Education, 6 hours; and Methods, 6 hours. These requirements may be met by several combinations of courses that are offered by the Division of Education. The following are suggested:

Psychology: six hours are required.

*Education I..... 3 hours
or

*Rural Education III..... 4 hours

Psychology I, Ia, or Ib..... 3 hours

Education 7, 17..... 3 hours

Rural Education I16..... 2 hours

*Education I or Rural Education III must be taken and work elected from the other courses to make a minimum of 6 credit hours.

History and Principles; six hours are required.

Education 2, 3a, 3b, 5, 13, 16.

Rural Education I, 101, 194.

At least one course in History of Education and one in Principles of Education are required.

Methods; six hours are required.

Education 4, 4a.

Rural Education 7, 121, 125, 131, 135, 136, 161, 185.

Elections from methods courses in academic subjects, pages 6 and 7.

Education 4 or Rural Education 121 is required of all students.

Students should obtain advice from members of the Division of Education regarding elections from this group.

The courses suggested above are the ones that are normally expected to be used in meeting certification requirements. Substitutions should be made only with the approval of members of the Division.

Requirements for certification vary from state to state. These variations are so marked that adequate information cannot be given in brief space. It is the intention of the Division to offer such courses which will insure qualification for teaching certificates generally, but in many cases this will involve the working out of special programs for individual students. Accordingly, students are advised to communicate with the office of the Division of Education for information regarding their special needs.

THE SUMMER SESSION

The term of the Cornell University Summer Session covers a period of six weeks from early July to the middle of August. A wide range of courses is offered for those in educational work. Prospective students should apply to the Secretary of the Summer Session for a copy of the official announcement.

COURSES OF INSTRUCTION

In the statement of courses given below the term "Education 1," "Education 2," etc., given in parenthesis following the name of the course, indicates that the course is offered by the Department of Education. "Rural Education 1," "Rural Education 101," etc., means that the course is offered by the Department of Rural Education.

All courses offered by the Department of Education require Psychology 1, 1a, or 1b, as a prerequisite. In the Department of Rural Education courses numbered under 100 are intended primarily for underclassmen; those from 101 to 200 are primarily for upperclassmen and graduate students; while those numbered 201 and over are primarily for graduate students. It should be noted that courses carrying the same name are not necessarily equivalents.

COURSES OFFERED IN 1927-28

These courses are listed in the same order as they occur in the announcement. A statement of certification requirements is given on page 7.

GENERAL COURSES (page 10.)

Rural Education 1	Introduction to Problems of Public Education. Second term.
Rural Education 101.	Introduction to Problems of Public Education. First term.
Rural Education 299.	General Seminary in Rural Education. First term.
Education 20 and 21.	Seminary in Education. First and second terms.

PSYCHOLOGY (pages 10 f.)

Education 1.	Educational Psychology. Either term.
Rural Education 111.	Psychology for students of Education. Either term.
Rural Education 211a.	Psychology for students of Education. First term.
Rural Education 218.	Seminary in Educational Psychology. Second term.
Education 6.	Experimental Education. Second term.
Education 17.	Mental Development. First term.
Education 8.	Experimental Investigation. Either term.
Education 9.	Reading of German Educational Psychology. First term.
Rural Education 116.	Psychology for students of Child Training. Second term.
Rural Education 117.	Psychology for students of Economics and Sociology. First term.

EDUCATIONAL METHOD (pages 11 ff.)

Rural Education 121.	Method and Procedure in Teaching in Secondary Schools. Either term.
Education 4.	Method and Procedure in High School Teaching. First term.
Education 4a.	Observation and Practice in High School Method. First term.
Rural Education 222.	Principles of Method. Second term.
Rural Education 223.	The Teaching of Elementary School Subjects. First term.
Rural Education 125.	The Teaching of Science in the Rural Secondary School. Second term.

- Rural Education 226. Research in Science Teaching. Either term.
 Rural Education 227. Seminary in Elementary Education. Second term.
 Rural Education 131. Teaching Agriculture in the High School. First and second terms.
 Rural Education 133. Directed Teaching in Agriculture. Either term.
 Rural Education 135. The Teaching of Home Economics in the High School. Second term.
 Rural Education 136. Directed Teaching in Home Economics. Either term.
 Rural Education 239. Problems of Extension Teaching. Second term.
 Rural Education 241. Preparation of Teachers for Normal Schools and Colleges. Second term.
 Rural Education 243. Problems of College Teaching. Second term.
 Rural Education 245. College Preparation of Teachers of Agriculture for Departments in Secondary Schools. Second term.
 Rural Education 248. The Preparation of Teachers of Home Economics. First term.
 Rural Education 250. Seminary in Agricultural Education. Second term.

EDUCATIONAL MEASUREMENT (page 14.)

- Education 7. Mental and Educational Measurement. First term.
 Rural Education 251. Mental and Educational Measurement. Second term.
 Rural Education 252. Conferences on Statistical Methods. Either term.
 Rural Education 253. Statistics for Students of Education. First term.

EDUCATIONAL ADMINISTRATION AND SUPERVISION (pages 14 f.)

- Rural Education 161. Principles of School Administration and Supervision. First term.
 Education 10. City School Administration and Supervision. First and second term.
 Rural Education 261. The Administration of Rural Schools. First term.
 Rural Education 262. Special Problems in School Administration. Second term.
 Rural Education 263. Procedures and Technique in Supervision. First term.
 Rural Education 264. Seminary in Rural School Administration. Second term.
 Rural Education 267. Administration and Supervision of Vocational Agriculture. First term.
 Rural Education 276. Principles of Curriculum Building. Second term.

HISTORY OF EDUCATION (page 15.)

- Education 3. History of Education. First and second terms.
 Education 13. History of American Education. First term.
 Education 16. Readings in the History of Education. Second term.

SECONDARY EDUCATION (page 16.)

- Education 2. Principles of Secondary Education. Second term.
 Rural Education 281. Rural Secondary Education. First term.
 Rural Education 285. The Rural and Village Principalship. First term.
 Rural Education 288. Seminary in Rural Secondary Education. Second term.

PHILOSOPHY OF EDUCATION (page 16.)

- Rural Education 292. Introduction to Philosophy of Education. First term.
 Education 5. Philosophy of Education. Second term.
 Rural Education 194. Education and Vocations. Second term.

NATURE STUDY (page 17.)

- Rural Education 7. Nature Study. Second term.
 Rural Education 109. The Nature Study Movement and Its Makers. First term.

GENERAL COURSES

Introduction to Problems of Public Education (Rural Education 1). Second term. Credit three hours. Open to freshmen and sophomores only. T Th 9 and conferences to be arranged. *Caldwell* 143. Professor WORKS.

The purpose of this course is to introduce students to some of the more important problems of public education.

Introduction to Problems of Public Education (Rural Education 101.) First term. Credit two hours. Open only to sophomores and juniors who have not taken Rural Education 1. T Th 9. *Caldwell* 143. Professor WORKS.

General Seminary in Rural Education (Rural Education 299). First term. Credit one hour. Required of all graduate students majoring in rural education. Th 4:30. *Caldwell* 282. Professor WORKS.

Seminary in Education (Education 20). First term. Credit two hours. Prerequisite, Education 1. Professor OGDEN. M 4-6. *Goldwin Smith* 248.

Topics relevant to the fundamental assumptions of educational theory will be chosen. Primarily for graduate students.

Seminary in Education (Education 21.) Second term. Credit two hours. Admission by permission of the instructor. Professor JORDAN. M 4-6. *Goldwin Smith* 248.

Topics developing from historical and current problems of educational practice, especially as related to administration and conduct of the public school system and of the university. Primarily for graduate students.

PSYCHOLOGY

Educational Psychology (Education 1). Either term. Credit three hours. Lectures and recitations. First term: Drs. FREEMAN and BRUCE. M W F 11. Second term: Professor OGDEN and Dr. FREEMAN. M W F 10. *Goldwin Smith* 142.

A study of functional psychology with special reference to the learning process and its application to educational theory and practice.

Psychology for students of Education (Rural Education 111). Either term. Credit four hours. Open to juniors and seniors. Professor KRUSE, Assistant Professors BAYNE and BROWNELL.

First term:

Section 1, lectures, M W F 11, *Caldwell* 143; laboratory, T 2-4:30, *Caldwell* 282.

Section 2, lectures, M W F 11, *East Roberts* 232; laboratory, W 2-4:30, *Caldwell* 282.

Section 3, lectures, M W F 9, *Caldwell* 143; laboratory, Th 2-4:30, *Caldwell* 282.

Second term:

Section 1, lectures, M W F 11, *Caldwell* 143; laboratory, W 2-4:30, *Caldwell* 282.

Section 2, lectures, M W F 8, *Caldwell* 143; laboratory, Th 2-4:30, *Caldwell* 282.

Psychology for students of Education (Rural Education 211a.) First term. Credit four hours. For mature students with teaching experience. M W F 11-12:30. *Marketing*. Professor KRUSE.

[**Psychology for students of Education** (Rural Education 211b). Second term. For members of the teaching staff. M W F 11-12:30, *Roberts* 392. Professor KRUSE. Not offered in 1927-28.]

Seminary in Educational Psychology (Rural Education 218). Second term. Credit two hours. Th 4-6. *Caldwell* 282. Professor KRUSE.

Experimental Education (Education 6). Second term. Credit two hours. Prerequisite, Education 1 or the equivalent and Psychology 3. Dr. FREEMAN. T Th 2. *Goldwin Smith* 248.

The chief problems of experimental education; the application of psychological and statistical methods to problems in educational psychology; chief results and practical bearings.

Mental Development (Education 17). First term. Credit two hours. Prerequisite, Education 1 or the equivalent. Professor OGDEN. T 2-4. *Goldwin Smith* 248.

A course in child psychology, dealing with the facts of mental growth and their interpretation.

Experimental Investigation (Education 8). Either term. Credit and hours to be arranged. Prerequisite, Education 6 or 7. Professor OGDEN and Dr. FREEMAN. *Goldwin Smith* 251.

Experimental study of a special problem in educational psychology or in mental measurements.

Reading of German Educational Psychology (Education 9). First term. Credit two hours. Prerequisite, Education 1 or the equivalent. Professor OGDEN. W 4-6. *Goldwin Smith* 248.

The aim of the course is to aid in facility of translation and to familiarize the student with certain monographic literature.

Psychology for students of Child Training (Rural Education 116). Second term. Credit two hours. Open only to students who have had Rural Education 111 or its equivalent. T Th 11. *Caldwell* 100. Professor KRUSE.

Psychology for students of Economics and Sociology (Rural Education 117). First term. Credit four hours. An elementary course in psychology. Open to juniors, seniors, and graduate students. (Graduate students planning to teach should take Rural Education 211a.) Lectures, M W F 10, *Marketing*; Laboratory, M 2-4:30, *Caldwell* 282. Assistant Professor BROWNELL.

EDUCATIONAL METHOD

Method and Procedure in Teaching in Secondary Schools (Rural Education 121). Either term. Credit three hours. Open to juniors and seniors who have completed Rural Education 111 or its equivalent.

Lectures: first term, M W F 11, *Poultry Building* 174; second term, section 1, M W F 11, *Caldwell* 100; section 2, M W F 8, *Roberts* 292. Professors FERRISS, BUTTERWORTH, and MOORE,

The development of certain principles of teaching in secondary schools, and their application to practical questions arising from the problems of selecting and organizing teaching materials, planning class work, making the assignment, determining classroom and laboratory methods, directing study, managing the class, measuring the results of teaching, and so forth, considered in the light of the principles developed.

Method and Procedure in High School Teaching (Education 4). First term. Credit three hours. For seniors only. Professor JORDAN. M W F 11; M W F 3. *Goldwin Smith* 256.

Designed for students who expect to teach in secondary schools. The relation and duties of high school teachers to their students, to the community, and to the state; methods of class management and types of recitation. Observation of actual high school classes required.

Observation and Practice in High School Method (Education 4a). First term. Credit one hour. For seniors only. Professor JORDAN and Dr. BRUCE. M 4. *Goldwin Smith* 256.

Planned to be taken coincidentally with Education 4.

Principles of Method (Rural Education 222). Second term. Credit three hours. Prerequisite, Rural Education 211a or its equivalent and teaching experience. Lectures, M W F 9. *Caldwell* 282. Professor STEWART.

Designed to develop through concrete situations the principles underlying successful teaching experience. Each student evaluates the principles discussed in the light of some definite instruction unit.

The Teaching of Elementary School Subjects (Rural Education 223). First term. Credit three hours. M W F 8. *Caldwell* 282. Professor MOORE.

A course designed for experienced elementary school teachers, supervisors, and others who are concerned with recent developments in this field. A critical consideration of important research studies which have a direct bearing upon the teaching of the elementary school subjects.

The Teaching of Science in the Rural Secondary Schools (Rural Education 125). Second term. Credit two or three hours. Prerequisite, Rural Education 111 and 121 or equivalents. Lectures, T Th 10, *Fernow* 16. Professor PALMER.

This course is designed to help high-school science teachers in the organization of their material, to aid them in introducing scientific ideas to high-school students, and to point out, particularly to teachers of biology, useful sources of information and supply. Opportunity is provided for observation in high-school science teaching for the third hour of credit.

Research in Science Teaching (Rural Education 226). Either term. Credit two hours. Open to graduate students who have done work in education. Special problems in science teaching. Professor PALMER.

Seminary in Elementary Education (Rural Education 227.) Second term. Credit two hours. T 4-6. *Caldwell* 143. Professor MOORE.

Open to graduate students who are especially interested in elementary school problems. The topics considered will vary from year to year depending upon the interests of those participating.

Teaching Agriculture in the High School (Rural Education 131). First and second terms. Credit three hours a term. Open to students who have completed Rural Education 111, who have met the farm-practice requirements, and whose progress in the prescribed courses in agriculture is adequate. Lectures, T Th 8, *Caldwell* 282. Laboratory, not less than a one-half day teaching period a week in the practice school. Conferences by appointment. Professor STEWART and Mr. HOSKINS.

A course based upon the activities of the teacher of agriculture in the secondary school, and including practice and directed teaching. Principles of teaching are evaluated in the light of the situations in which they take their rise. Special consideration is given to such problems as: the purposes of instruction, determination of courses of study and the making of curricula, the selection of methods of teaching, the setting up of teaching situations, and the evaluation of results.

Directed Teaching in Agriculture (Rural Education 133). Either term. Credit from one to three hours; amount to be determined by work done.

Open only to those who have taken, or are taking, Rural Education 131. Students planning to take this course should arrange with the instructor in advance of registration dates. Professor STEWART and Mr. HOSKINS.

Designed to give opportunity to persons preparing to teach agriculture, additional guidance and practice in the organization and conduct of teaching.

[Methods of Extension Teaching in Agriculture (Rural Education 137). Second term. Credit two hours. Open to seniors and graduate students. Prerequisite, Rural Education 111 or its equivalent. W F 9. *Roberts* 92. Professor EATON. Not offered in 1927-28.]

A study of methods of group and individual teaching appropriate to the work of county agricultural agents and junior project leaders.

[Methods of Extension Teaching in Home Economics (Rural Education 138). Second term. Credit two hours. Prerequisite, Rural Education 111 or its equivalent. W F 2-4:30, *Home Economics* 100. Professor EATON and Assistant Professor MORTON. (See Extension 100, College of Home Economics.) Not offered in 1927-28.]

A study with observation and practice, of methods of teaching appropriate to the work of county home demonstration agents and junior project leaders.

The Teaching of Home Economics in the High School (Rural Education 135). Second term. Credit three hours. Must be accompanied or preceded by Rural Education 121 or its equivalent. Should be taken by juniors. Lectures, T Th 8, *Home Economics* 100. Laboratory, T or Th 2-4:30, *East Roberts* 7. Professor BINZEL.

This course is concerned with modern methods of teaching as related to the field of home economics. Problems treated: types and purposes of homemaking courses; the needs and native interests of the high-school girl, and the project as one means of meeting these needs; the socialized curriculum; the socialized class hour and assignment; supervised study; the plant and equipment; textbooks; the school lunch; the relation of the home economics department to the school and to the community. A one-day excursion is a part of the course.

Directed Teaching in Home Economics (Rural Education 136). Either term. Credit two to five hours, amount to be determined by work done. Open to students preparing to teach home economics. Students planning to take this course should arrange with the department during the junior year. General conferences, S 8-10. First term, *Home Economics* 100; second term, *Caldwell* 282. Professor BINZEL, Miss HASTIE, and Miss BULL.

This course is designed to give students opportunity for observation and teaching under the guidance of the department. A week-end trip for the purpose of studying equipment is a part of the course.

Problems of Extension Teaching (Rural Education 239). Second term. Credit three hours. Open to graduate students who have completed Rural Education 211a or its equivalent, and who have had teaching or extension experience in agriculture or home economics; open also to graduate students or seniors who have completed Extension Teaching 103 and Rural Education 137, or Extension 100 (Home Economics) and Rural Education 138. Observation of extension teaching as opportunity permits is expected of all students. T Th 11-12:30. *Caldwell* 282. Professor EATON.

A study of aims, functions, and methods of extension teaching.

[Seminary in Problems of Extension Work (Rural Education 240). First term. Credit two hours. M 4-6. *Caldwell* 282. Professor EATON and members of the Extension Staff. Not offered in 1927-28.]

Preparation of Teachers for Normal Schools and Colleges (Rural Education 241). Second term. Credit three hours. M W F 10. *Caldwell* 282. Professor BUTTERWORTH.

To meet the needs of those now responsible for the training of teachers in rural elementary and secondary schools or who are preparing for such duties in normal schools and colleges.

Problems of College Teaching (Rural Education 243.) Second term. Credit three hours. Open to graduate students and members of the staff who have completed Rural Education 211a or 211b or the equivalents. M W 11-12:30. *Caldwell* 282. Professor EATON.

A study of methods in classroom, laboratory, and field teaching appropriate to the objectives of resident teaching in the college; in so far as time permits there will also be undertaken a study of course organization.

College Preparation of Teachers of Agriculture for Departments in Secondary Schools (Rural Education 245). Second term. Credit three hours. Open to graduate students of approved qualifications. M W F 2. *Caldwell* 492. Professor EATON.

A study of the organization of preparatory systems in the Land-Grant colleges for prospective teachers of agriculture in vocational departments of secondary schools.

The Preparation of Teachers of Home Economics (Rural Education 248). First term. Credit three hours. Open to graduate students only. T Th S 10. *Caldwell* 293. Professor BINZEL.

This course is designed to meet the needs of persons who have had both technical preparation in home economics and teaching experience, and who desire to prepare for the special problems involved in the professional work of preparing teachers of home economics subjects on a vocational basis. It treats of collegiate and secondary curricula in home economics with reference to the technical preparation of teachers, their professional needs, supervised teaching experience, and the organization and content of special-methods courses in home economics.

Seminary in Agricultural Education (Rural Education 250). Second term. Credit two hours. Open only to graduate students in agricultural education who have had Rural Education 245 and 267. W 4-5:30. *Caldwell* 143. Professor WORKS.

EDUCATIONAL MEASUREMENT

Mental and Educational Measurement (Education 7). First term. Credit three hours. Prerequisite, Education 1 or Rural Education 111. Dr. FREEMAN. Lectures, T Th 9, *Goldwin Smith* 236. Laboratory: Section A, T 2-4:30; Section B, Th 2-4:30. *Goldwin Smith* 248.

The single tests and test systems; the bearing of tests upon problems of psychological theory (nature and distribution of intelligence, the correlation of abilities, etc.). The laboratory work will afford some practice in administering individual and group tests.

Mental and Educational Measurement (Rural Education 251). Second term. Credit three hours. Prerequisite, permission to register. Primarily for graduate students. F S 11-12:30, *Caldwell* 282. Assistant Professor BAYNE.

Mental and educational measurement in relation to the classification of pupils, determination of the progress of pupils, and individual difficulties. The determination of final marks will be treated. Typical tests and scales, and common statistical terms and methods will be studied in relation to the above problems.

Conferences on Statistical Methods (Rural Education 252). Throughout the year. Credit may be arranged. Designed primarily for students of Education. By appointment. *Caldwell* 225. Assistant Professor BAYNE.

Statistics for Students of Education (Rural Education 253). First term. Credit two hours. Primarily for graduate students in education. *Caldwell* 225. T Th 2-3:30, Assistant Professor BAYNE.

A study of common statistical procedure in relation to critical reading of technical studies in education, to carrying on of research, and to writing reports of studies. Emphasis will be placed upon an understanding of the appropriate use of statistical procedures rather than upon skill in computation of statistical measures. As far as possible the work will be related to the problems of the individual student.

EDUCATIONAL ADMINISTRATION AND SUPERVISION

Principles of School Administration and Supervision (Rural Education 161). First term. Credit three hours. M W F 9. *Caldwell* 282. Professor BUTTERWORTH.

An introductory course covering the general problems of the field; types of school units; state and county organization; functions of boards of education; selection, promotion and tenure of teachers; training teachers in service; pupil accounting; the school building; curriculum reconstruction; financing the school system; and the like. Open to advanced undergraduates and to graduate students without administrative experience.

City School Administration and Supervision (Education 10). First and second terms. Credit two hours a term. Prerequisite, Education 1 or its equivalent. M W 9. *Goldwin Smith* 248. Professor JORDAN.

Principles of administration and supervision of state and city school systems, involving problems of evaluation and improvement of teaching, and of the subject matter in the public schools. The course will be adapted to the particular needs of the class.

The Administration of Rural Schools (Rural Education 261). First term. Credit three hours. T Th 11-12:30, *Caldwell* 282. Professor BUTTERWORTH.

A course for students of experience dealing with the problems of organizing and administering education in country and village districts.

Special Problems in School Administration (Rural Education 262). This course is divided into units in such a manner as to include the major problems of the school administrator.

A. School Finance. Second term. Credit two hours. T Th 9. *Caldwell 282.* Professor BUTTERWORTH.

A study of sources of school funds; relation of school revenues to wealth; types of equalization funds; methods of distributing such funds; cost accounting; budget making; and the organization of school taxation.

[B. The School Population. Second term. Credit two hours. Professor BUTTERWORTH. Not offered in 1927-28.]

[C. The School Plant. Second term. Credit two hours. Professor BUTTERWORTH. Not offered in 1927-28.]

Procedures and Technique in Supervision (Rural Education 263). First term. Credit three hours. Lectures, M W F 10, *Caldwell 282.* Professor MOORE.

The purpose of this course is to assist graduate students of experience to improve their supervisory procedures and techniques. The course will include a survey of the literature related to supervisory problems and an evaluation of the theories and practice involved. Schools will be visited and procedures observed from the viewpoint of the supervisor.

Seminary in Rural School Administration (Rural Education 264). Second term. Credit two hours. T 4:30, *Caldwell 282.* Professor BUTTERWORTH.

Designed for those desiring an intensive study of certain problems of rural school administration. The school survey will be emphasized this year.

Administration and Supervision of Vocational Agriculture (Rural Education 267). First term. Credit three hours. Open to graduate students only. Lectures, T Th 2-4:30, *Caldwell 294.* Professors WORKS and BINZEL.

A course designed for persons fitting themselves for supervision of agricultural and home economics educations. Topics treated: administration and supervision of agricultural and home economics education under the Federal Vocational Education Act; state organization for conduct of vocational education; curricula; supervision; and a comparative study of types of schools. School visitation is a required part of the course.

Principles of Curriculum Building (Rural Education 276). Second term. Credit two hours. For graduate students only. Lectures, T Th 2-3:30. *Caldwell 282.* Professor FERRISS.

A discussion of the major problems of curriculum content and organization in elementary and secondary schools with particular reference to rural conditions.

[Courses of Study and Systems of Farm Practice in Agriculture for Secondary Schools (Rural Education 277). First term. Credit three hours. Open to graduate students in Agricultural Education who have had Rural Education 245 and 257 or the equivalents. T Th 11-12:30. *Caldwell 282.* Professor EATON. Not offered in 1927-28.]

A study of the making of vocational courses in agriculture for secondary schools and the correlation provision of supervised farm practice.

HISTORY OF EDUCATION

History of Education (Education 3). (a) Greek, Roman, and Early Medieval. First term. Credit two hours. Open to upperclassmen and graduate students only. T Th 10. Professor LAISTNER. *Goldwin Smith 234.* (b) Medieval and Modern. Second term. Credit two hours. Open to upperclassmen and graduate students only. T Th 10. Professor Smith. *Goldwin Smith 234.*

History of American Education (Education 13). First term. Credit three hours. Prerequisite, Education 1 or its equivalent. T Th S 8. Dr. BRUCE. *Goldwin Smith.*

The origin and development of American educational movements and institutions, with special emphasis on public education and the social, religious, economic and political factors influencing its functioning. Brief consideration will be given to European educational background in relation to early American education.

Readings in the History of Education (Education 16). Second term. Credit three hours. Prerequisite, Education 1 and 3, or the permission of the instructor. Dr. BRUCE. T Th S 9. *Goldwin Smith 248.*

SECONDARY EDUCATION

Principles of Secondary Education (Education 2). Second term. Credit three hours. Prerequisite, Education 1 or its equivalent. Section I, M W F 2. Professor JORDAN. *Goldwin Smith* 234. Section II, T Th S 12. Dr. FREEMAN. *Goldwin Smith* 234.

The nature and significance of education; biological and psychological foundations; the school as a social institution; educational ideals and values; the curriculum; administration and general methods. Students who elect this course must apply at *Goldwin Smith* 248 for assignment to sections.

Rural Secondary Education (Rural Education 281). First term. Credit four hours. Designed primarily for graduate students. Lectures, M W F 9, and a period to be arranged. *Caldwell* 282. Professor FERRISS.

A course to consider some of the more basic problems in the nature, organization, curriculum, and extension of secondary education in its adaptation to rural needs. Among the topics treated are: the functions of rural secondary education; present demands upon the rural secondary school; the problems of curriculum building and subject matter; a comparative study of existing types of curricula and courses of study; prevocational and vocational work; pupil guidance; the rural secondary school and the adult.

The Rural and Village Principalship (Rural Education 285). First term. Credit two hours. Given in alternate years. Open to graduate students by special permission. T Th 11. *Stone* 192. Professor FERRISS.

A course designed primarily for those preparing to be principals of schools containing both the high school and the elementary school grades. Attention is given to the needs of those combining the work of principal and teacher of agriculture.

[The Junior High School (Education 12). Either term. Credit two hours. For seniors, graduates, and other qualified students. Professor JORDAN. W 4-6. *Goldwin Smith* 234. Not offered in 1927-28.]

Psychological, biological, and pedagogical bases for the Junior High School; fundamental principles; organization and administration; curricular content in detail; methods of instruction.

Seminary in Rural Secondary Education (Rural Education 288). Second term. Credit two hours. Professor FERRISS.

PHILOSOPHY OF EDUCATION

Introduction to Philosophy of Education (Rural Education 292). First term. Credit three hours. Prerequisite Rural Education 211a and one year of graduate study. M W 2:30-4:00. *Caldwell* 143. Professor STEWART.

A critical treatment of the modern views of education, particularly as they relate to the school; and an interpretation of the means and methods of education which these views imply, particularly as observed in the development of a science of education.

Philosophy of Education (Education 5). Second term. Credit two hours. Prerequisite, Education 1 or its equivalent and at least one course in Philosophy. Professor OGDEN. W 2-4. *Goldwin Smith* 248.

A study of education as interpreted by the more important philosophical conceptions and theories, with special application to the spirit and demands of modern society.

Education and Vocations (Rural Education 194). Second term. Credit three hours. Open to seniors and graduate students who have completed Rural Education 111 or its equivalent and a course in Principles of Economics. T Th S 9. *Caldwell* 282. Professor EATON.

A study of the character of vocations and the organization of economic society in their bearings upon the aims and functions of education in a democracy.

NATURE STUDY

[Field Nature Study (Rural Education 6). First term. Credit one hour. Field trip Monday afternoon. *Fernow* 16. Professor PALMER. Will alternate with Rural Education 109 beginning in 1927. Not offered in 1927-28.]

This course is designed to meet the needs of rural and other elementary school teachers, high-school teachers of science, camp councilors and directors, leaders in scout organizations, and junior project workers who wish instruction based on field work.

Nature Study (Rural Education 7). Second term. Credit three hours. Prerequisite, one-half year of botany, biology, or zoology. Lecture, M 12, *Fernow* 16. Practical exercises, M W 2-4:30, and T Th 2-4:30. Professor PALMER.

Laboratory and field practice with those subjects in plant and animal life that are most suitable for nature study in the elementary schools. Special attention is given to the methods of study, manner of presentation, and relation of the topics to agriculture. A study of the history of the nature study movement and of present-day practices in nature study is made. The New York State Nature Study Syllabus and the correlation of nature study with other subjects are given consideration.

The Nature Study Movement and Its Makers (Rural Education 109). First term. Credit two hours. M W 10, *Fernow* 16. Prerequisite, Rural Education 111, 121, and 7. Professor PALMER. Will alternate with Rural Education 6 beginning in 1927.

Discussions of the history of the nature movement, with consideration of the contributions made to it and to elementary school methods by administrators, educators, scientists, dramatists, and writers of prose, poetry, and fiction. The graded courses in nature study outlined for various States are considered, as a means of assisting in the perfection of similar work in the public schools in New York State.

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